

Chelan County

\$869,664

Creating Off-channel Habitat Chelan County Natural Resource Program

\$366,325

Chelan County Natural Resource Program will use this grant to help provide off-channel habitat for spring Chinook, endangered summer steelhead trout and other salmonids in the lower Wenatchee River. Construction of dams and roads, logging and human use have decreased the amount of off-channel habitat and reduced native plantings along the river, two factors limiting salmon populations. The grant will help create about .56 acre of off-channel habitat, used by salmon for resting, rearing their young and hiding from predators. It also will connect .5 acre of isolated ponds, directly benefiting young Chinook and coho salmon and steelhead. Crews also will restore 1.39 acres. The County will contribute \$65,000 from a local grant. (05-1546R-FY06)

Improving Entiat River Habitat Chelan County Natural Resources

\$212,500

The Chelan County Natural Resource Program will use this grant to improve habitat in the Entiat River for the endangered spring Chinook salmon. Work will be done from Slackwater reach to Preston Creek. Crews will place about five cross vanes in the lower Entiat River to increase the number of pools, which salmon need for feeding, resting and hiding from predators. In the upper middle Entiat, crews will place five log retention structures, which are aimed at increasing habitat diversity. The County will contribute \$37,500 from a local grant. (05-1591R-FY06)

Restoring the Nason Creek Off-Channel Habitat Chelan County Natural Resource Program

\$106,247

The Chelan County Natural Resource Program will use this grant to take a step toward reconnecting about 5,500 linear feet of off-channel habitat for endangered spring Chinook salmon and endangered summer steelhead trout in lower Nason Creek. Within the Nason Creek watershed, more than 400 acres of side channels and oxbows have been cut off from the main channel by highways and railroad tracks. Salmon and other fish rely on the side channels for refuge and food. Reconnecting these off-channel areas is the most feasible tool for increasing the rearing habitat for salmon and steelhead. The grant will pay for a hydraulics and hydrology analysis, engineering and design work to determine the most appropriate restoration action at the Nason oxbow site. Reconnecting 5,500 linear feet of oxbow will increase the total off-channel habitat in lower Nason Creek by 11 percent. The County will contribute \$19,000 from a local grant. (05-1552N-FY06)

Replacing the Skinney Creek Culvert Chelan County Natural Resource Program

\$64,592

The Chelan County Natural Resource Program will use this grant to fix a problem culvert and reduce blockages to salmon migrations. The Skinney Creek culvert is a substantial barrier to fish because of its high outfall drop and the high speed of water



flowing through it. Skinney Creek is a tributary of Chiwaukum Creek, which is home to endangered spring Chinook, endangered summer steelhead and bull trout, which are threatened with extinction. The County will contribute \$11,399 from a local grant. (05-1509R-FY06)

Reconfiguring Beebe Creek Channel Lake Chelan Sportsman's Association

\$120,000

The sportsman's association will use this grant to reconfigure Beebe Creek to increase salmon spawning and rearing habitat. Beebe Creeke is a spring-fed tributary to the Columbia River and it produces consistent quantities of cold water throughout the summer. The creek is home to steelhead trout and Chinook and coho salmon. Channelized for agricultural purposes, the creek now flows through a straight, ditch-like course with limited spawning gravel, little overhead cover and degraded riparian conditions. Work will include constructing a new winding channel, more than doubling the length of the creek. The additional wetland and riparian areas created will protect this unique coldwater resource and enhance shoreline habitat complexity along the Columbia River. The sportsman's association will contribute \$279,948 in cash, a state grant, donated materials and volunteer labor. (05-1614R-FY06)

Grays Harbor County

\$611,000

Controlling Sediment from Wishkah Road Chehalis Basin Fisheries Task Force

\$300,000

The Chehalis Basin Task Force will use this grant to reduce the sediment that is impacting spawning in the Wishkah basin. Trucks hauling logs and gravel are grinding the roads' gravel surfaces into fine particles. Incorrectly-built road ditches become plugged, directing sediment-laden water into streams, which flow directly to the Wishkah River. Three gravel roads in the upper basin are contributing 86 percent of the sediment in the entire river basin. The river system has 452 percent more sediment than is natural; only a few rivers in western Washington have levels this high. This grant will be used to improve the ditches by adding cross drains, directing stormwater away from streams, elevating the road where needed and paving the road. This project will improve spawning and rearing conditions for Chinook, coho and chum salmon, steelhead and cutthroat throughout the Wishkah River system. The task force will contribute \$112,500. (05-1502R-FY06)

Assessing Fish Passage Barriers Lewis County Conservation District

\$103,000

The Lewis County Conservation District will use this grant to develop maps and databases of all blockages (culverts, dikes, railroad grades, etc.) for salmon from the confluence of Scatter Creek to the Satsop River on the north side of the Chehalis River and from the confluence of Garrard Creek to Fuller Creek on the south side of the river. This information is needed for prioritizing restoration efforts. Conservation district employees will compile assessment data from several sources and complete the



remaining surveys needed to have holistic information available. The conservation district will contribute \$25,000 from a federal grant. (05-1505N-FY06)

Replacing Dry Bed Creek Culvert Mason County Public Works

\$208,000

Mason County will use this grant to replace a culvert on Dry Bed Creek where it crosses the Beeville Loop Road. The culvert is a barrier to fish passage because of a high outfall drop. It is only 33 percent passable to trout. The existing 9- by 16-foot oval culvert will be replaced with a 34-foot open bottom arch culvert. A downstream plunge pool will be filled to return the streambed to its natural profile. Replacement of the culvert will provide access to 4.7 miles of habitat. The creek is home to chum and coho salmon and coastal cutthroat. The County will contribute \$52,000 in equipment and donated labor. (05-1523R-FY06)

Hood Canal Coordinating Council \$1,592,883

Restoring the Klingel Estuary Great Peninsula Conservancy

\$50,000

The Great Peninsula Conservancy will use this grant to restore estuarine/salt marsh functions to the Union River estuary. During the mid-1900s, this salt marsh area was modified with a dike and ditch to support agricultural activities. Historical maps, aerial photos and a topographic survey have shown that several tidal channels were severed with the construction of the dike and 13 acres of salt marsh were lost. When the dike is removed, several previous tidal channels will be reestablished. The estuary will be allowed to re-grow plants naturally. The conservancy will contribute \$200,000 from a federal grant. (05-1602R-FY06)

Protecting Salmon Habitat at Richert Ranch Cascade Land Conservancy

\$248,876

The Cascade Land Conservancy will use this grant to protect critical salmon habitat by purchasing land protection agreements for about 150 acres of the Richert Ranch at the confluence of the north and south forks of the Skokomish River. The agreements will protect in perpetuity about 2.4 miles of habitat for Chinook and summer chum salmon both of which are threatened with extinction, as well as bull trout, steelhead and coho and fall chum salmon. Since an agricultural dike failed, the north fork of the river is flowing through a cattle pasture and into Richert Springs, an off-channel refuge, creating a new confluence about 1.25 miles downstream. The portion now flowing through the cattle ranch will undergo significant restoration once land protection agreements have been signed. The land conservancy will contribute \$91,500 in funding, donated labor and a federal grant. (05-1603A-FY06)



Restoring the Dosewallips Estuary Washington Trout

\$210,775

Washington Trout will use this grant to design and install up to six logjams and remove about 150 cubic yards of bank armoring along the lower Dosewallips River. This work continues a partnership between Washington State Parks and Recreation Commission, Washington Trout, the Hood Canal Coordinating Council, Port Gamble S'Klallam Tribe, Washington Department of Fish and Wildlife and Brinnon-area residents. In the first phase, the group removed 1,000 feet of dike, restoring 40 acres of salt marsh. The group also removed blackberry bushes, replanted native trees and shrubs on 5 acres, designed and installed two interpretive signs and developed a conceptual analysis to guide phase two. The analysis of environmental conditions revealed a chronic lack of large woody debris, such as tree root wads, which are key to forming habitat critical to salmon. This lower one-half mile of the Dosewallips River represents a stronghold for threatened Hood Canal summer chum and Puget Sound Chinook. The grant also will help pay to install interpretive signs, remove exotic plants and plant native trees and shrubs along the lower river channel. Washington Trout will contribute \$150,000 from a federal grant. (05-1606R-FY06)

Restoring the Belfair State Park Estuary Hood Canal Salmon Enhancement Group

\$512,950

Hood Canal is one of the most scenic and productive marine environments of Puget Sound. However, habitat loss and low dissolved oxygen levels threaten Hood Canal's health. The Hood Canal Salmon Enhancement Group will use this grant to help reverse these trends by restoring 8.1 acres of estuarine wetlands and removing 2,700 feet of rip rap hardened shoreline at Belfair State Park. The estuary is created by two creeks that flow through the park. The park shoreline consists of rip rap and fill placed in the 1950s to develop day-use facilities. A tide gate was installed in one area to create a swimming hole. These changes resulted in a significant loss of estuarine habitat. In addition, both creeks have been channelized. By removing the fill and rip rap, the creek will be able to take a more natural course into the restored estuary and Lower Hood Canal, which provides necessary migratory habitat for summer chum salmon, which are threatened with extinction. The grant also will help pay for the removal of the tide gate and swimming hole and moving the campground bridge, which blocks woody debris and sediment creating a fish-passage barrier, on Little Mission Creek. The Hood Canal group will contribute \$1.8 million in labor and money from federal, state and local grants. (05-1608R-FY06)

Decommissioning Brown Creek Road Hood Canal Salmon Enhancement Group

\$184,000

The Hood Canal Salmon Enhancement Group will use this grant to minimize the sediment coming off roads and affecting spawning and rearing habitats of bull trout and steelhead in Brown Creek and the lower south fork of the Skokomish River. The salmon group will decommission Forest Service roads 2354-300 and -310 as well as remove nine large fills and unstable slopes and improve hillside drainage on roads in



the Olympic National Forest. The salmon group will contribute \$42,200 in donated labor and a federal grant. (05-1611R-FY06)

Restoring Big Quilcene Logjam Skokomish Tribe

\$386,282

The Skokomish Tribe will use this grant to improve the diversity and value of habitat in the Big Quilcene River. The Quilcene River is home to Hood Canal summer run chum, which are threatened with extinction, and fall chum, coho, steelhead and coastal cutthroat. Restoration work will begin to reverse the adverse effects of the past 50 years of clearing, logging, diking, dredging and bank armoring. These activities have resulted in a straightened river corridor, a loss of the river's connectivity to its floodplain and secondary channels and a reduction in habitat complexity. The Tribe will construct log jams and other habitat features that will collect wood, deposit gravel, reduce flooding impacts and create pools. The Tribe will contribute \$76,600 from a federal grant and donated equipment and materials. (05-1612R-FY06)

Island County

\$845,020

Protecting Livingston Bay Nearshore Whidbey Camano Land Trust

\$400.000

The Whidbey Camano Land Trust will use this grant to purchase and protect 3,000 acres of high quality estuarine, nearshore habitat in Livingston Bay, located in the western portion of Port Susan Bay. The land includes tidelands, a 7-acre pocket estuary and an easement on the forested bluff. The tidelands are particularly important for Chinook salmon during their first days of migration from the nearby Stillaguamish River. This is a critically important spawning area for forage fish, including sand lance and surf smelt, and the shoreline is a primary pathway for migrating bull trout. Protection of this type of high quality nearshore habitat will be needed if salmon recovery is to be successful. This grant will mean that about 7,000 acres of contiguous and highly functioning tidelands will be protected. Adjacent lands protected for fish and wildlife habitat include 4,000 acres of tidelands owned and protected by The Nature Conservancy, Washington Department of Fish and Wildlife's 315-acre Leque Island and the 120-acre Iverson Spit conservation area and associated tidelands protected by Island County. The land trust will contribute \$75,000 in labor and donations.

Assessing Restoration Projects in the Skagit Basin Skagit River System Cooperative

\$146,324

The Skagit River System Cooperative will use this grant to assess possible restoration and protection projects at 10 nearshore pocket estuaries in the Skagit basin and begin designing a restoration project at one of these sites. Work will include identifying landowners interested in participating in a project, evaluating the restoration and protection potential, providing a comprehensive technical report and prioritized list of projects and completing 30 percent of the design for the highest priority site with



landowner willingness. The cooperative will partner with Island County Marine Resource Committee, King County and the National Oceanic and Atmospheric Administration. The project will benefit five salmon species including Chinook, and will address salmon distribution and restoration or protection of critical rearing habitats. The cooperative will contribute \$25,823 from a federal grant. (05-1475N-FY06)

Assessing How to Protect Ala Spit Island County Public Works

\$151,846

Ala Spit County Park is 5 miles from the Skagit River and consists of an eight-acre sand and gravel spit, 4 acres of uplands and 5,000 linear feet of beach and tidelands. Ala Spit contains a pocket estuary and is maintained by sediments transported along the shore from a southern feeder bluff. Ala Spit is important for young salmon and forage fish but is close to being breached at the base, endangering the pocket estuary. Nearby bulkheads and a small rock jetty may contribute to the problem. This grant will be used to identify strategies to protect fish habitat and physical processes that maintain Ala Spit by evaluating sediment supply and transport, habitat and land issues. The project will provide recommended restoration activities, including a partial design to restore the spit. Island County will contribute \$35,795 in equipment, labor, materials and donated labor.

Studying Fish Use of West Whidbey Island Washington Trout

\$146,850

The western shore of Whidbey Island forms half of a bottleneck through which salmon migrating from the rivers of Puget Sound and Hood Canal pass to reach the Pacific Ocean. It is estimated that millions of salmon use the nearshore and estuarine habitats of western Whidbey Island as they migrate. Data generated by this project will assist in prioritization of habitat protection and restoration projects on the western shore of Whidbey Island. Washington Trout will use this grant to conduct beach seine sampling at five sites. All salmon will be enumerated, identified and analyzed to determine origin (hatchery versus wild). To determine river stock of origin, genetic sampling will be done. Washington Trout will contribute \$27,000 in donated equipment and volunteer labor. (05-1478N-FY06)

King County WRIA 8

\$1,523,921

Protecting Cedar River Habitat King County Water & Land Resources Division

\$900.621

King County will use this grant to purchase 14 parcels comprising the upstream half of the riparian corridor on Cedar River, from river mile 11 to 11.4, known as the Belmondo Reach. The long-range vision for the Belmondo Reach is to create a floodplain corridor of natural areas and an unconfined river that contains diverse river features, including substantial deposits of large woody debris, which is a critical factor in salmon habitat. King County will contribute \$1.6 million from federal and local grants. (05-1372A-FY06)



Preserving Middle Issaquah Creek King County Water & Land Resources Division

\$623,300

King County will use this grant to acquire up to five parcels along Issaquah Creek, which is home to Chinook, sockeye, coho and kokanee salmon, char, steelhead and cutthroat. The immediate benefits are the protection of up to 47 acres of forests, wetlands and streamside corridor along about one-half mile of both sides of Issaquah Creek and more than 500 feet of three salmon-bearing tributaries to Issaquah Creek. The mature forests and wetlands throughout this reach are essential for the protection of water quantity and quality and fish habitat for all of Issaquah Creek and Lake Sammamish. King County will contribute \$300,000 from conservation futures.

King County WRIA 9

\$1,016,211

Removing Fenster Levee Auburn Parks & Recreation Department

\$675,900

The City of Auburn will use this grant to remove about 700 linear feet, including rock armoring, of Fenster Levee (along the Green River) and create a low bench and gently sloping river bank. The City also will place large woody debris along the toe of the bank and on the bench to provide cover for fish and dissipate the energy of floodwater. The bank will be densely planted with native trees and shrubs to improve wildlife habitat. A channel that was partially filled decades ago when the property was a farm will be excavated to provide off-channel habitat and will be connected to Pautzke Slough, which can provide a place for young salmon to stay during high water and over the winter. Nearby grass pastures will be excavated and returned to their original height before construction of Howard Hanson Dam. Auburn will contribute \$135,500 in funding, volunteer labor, donated materials and a grant. (05-1398R-FY06)

Studying Fixes For Restoring Mill Creek's Floodplain City of Kent

100,000

The lower quarter mile of Mill Creek (a tributary to the Green River) is deeply incised and no longer connected to its floodplain. In order to restore the floodplain functions, a side channel and winter pond complex need to be created. King County will use this grant to study the feasibility of creating those elements and do a partial design. The design will include removal of invasive plants and creation of a replanting plan. Hydraulics and soil studies will be conducted to determine the feasibility of connecting the side-channel to the Green River. Issues of sedimentation and maintenance of the channel and pond will be examined. Kent will contribute \$200,000 in funding and conservation futures. (05-1519N-FY06)

Studying Bulkhead Removal at Beaconsfield on the Sound Cascade Land Conservancy

\$50,873

Beaconsfield on the Sound is comprised of 33 small, privately owned parcels along Puget Sound in Normandy Park. This area consists of 4 acres of historic feeder bluffs,



shallow habitat, tidelands and more than ¼ mile of beach that are critical for sustaining habitat-forming processes essential for salmon. The feeder bluff has been disconnected from the nearshore by a series of bulkheads that extend across 80 percent of the property. The bulkheads prevent soil from entering the water, which ultimately prevents the forming of habitat for forage fish and salmon. The Cascade Land Conservancy will use this grant to assess landowner willingness to sell or donate land and determine the impacts of removing the bulkhead. The conservancy will contribute \$8,977 in donated labor and both a state and federal grant. (05-1471N-FY06)

Protecting and Restoring Ellis Creek Estuary King County Water & Land Resources Division

\$189,438

The Ellis Creek salt marsh is in Tramp Harbor on the east side of Vashon Island. King County will use this grant to buy 3 acres of forest and remove a dirt road that bisects the salt marsh cutting off about 30 percent of the marsh from tidal influence and salmon rearing. Restoration of the salt marsh will help address the loss of Chinook salmon rearing habitat by restoring and reconnecting the salt marsh at the mouth of Ellis Creek. King County also will remove non-native plants near the salt marsh and replant the area. To remove the road, King County will need to buy the 3 acres of forest, to which the dirt road provides access. The County will manage the land in partnership with the Vashon Island Land Trust and island volunteers. King County will contribute \$40,000.

Kitsap (East) Peninsula

\$973,050

Protecting Chico Creek Kitsap County

\$198,000

Kitsap County will use this grant to acquire 5.5 acres that contain 2,200 feet of riparian habitat along both sides of Chico Creek, east Kitsap's most productive salmon stream. This land is the only reach of Chico Creek in the urbanized part of the watershed that has retained access to its floodplain, its large woody debris and a complex profile of pools and riffles, all elements of good salmon habitat. The land contains large patches of invasive plants, a 1-acre gravel parking lot and an illegal dump site. Kitsap County will convert the parking lot into a salmon viewing and education park, remove the invasive plants, replant the area with native plants and create a trail system with interpretive signs. Much of the initial work and future maintenance will be coordinated with Stream Team volunteers. Kitsap County will contribute \$35,000 in funding, donated materials and volunteer labor. (05-1389A-FY06)

Restoring the Beaver Creek Estuary Mid-Puget Sound Fisheries Enhancement Group

\$485,050

The Mid-Puget Sound Fisheries Enhancement Group will use this grant to increase the Beaver Creek estuary by 4.5 acres and the habitat along the creek by 1,200 feet of shoreline, both of which are vital resources for the area's threatened and endangered salmon. This project continues a stream restoration project on the lower reaches of



Beaver Creek, near Manchester. Work will include upgrading a culvert, removing the outlet fish ladder, reconstructing the greater estuarine habitat and reestablishing a saltwater wedge into the upper estuary. The project area is on U.S. Navy property at the Manchester Fuel Depot. In 2003, work on an extensive fish passage and habitat enhancement project for Beaver Creek as it runs through the fuel depot was completed. In 2004, construction began to provide natural stream meanders for the lower reaches of the creek. This third phase will extend the restoration work to the estuary at Clam Bay. The Mid-Puget Sound Fisheries Enhancement Group is partnering with the U.S. Navy and the Suquamish Tribe. The fisheries group will contribute \$208,950 in donated materials and volunteer labor. (05-1437R-FY06)

Replacing a Rocky Creek Culvert South Puget Sound Salmon Enhancement Group

\$290,000

The South Puget Sound Salmon Enhancement Group will use this grant to replace an undersized culvert on Rocky Creek, about 15 miles west of Purdy. Two other culverts on the west fork of Rocky Creek also are being replaced. Combined, replacing these culverts will open about 5 miles of spawning and rearing habitat for Chinook, coho and chum salmon, steelhead and cutthroat. The salmon group will contribute \$63,100 in donated cash and materials and volunteer labor. (05-1395R-FY06)

Klickitat County

\$1,415,570

Restoring the Klickitat Floodplain Columbia Land Trust

\$547,123

The Columbia Land Trust will use this grant to restore part of the Klickitat floodplain between river miles 18.3 and 32.2 of the Klickitat River. This portion of the river has the greatest habitat complexity of any reach in the lower Klickitat River and provides critical spawning, migrating and rearing habitat for winter and summer steelhead, which are threatened with extinction, and for Chinook and coho salmon. The grant will enable the land trust to breach portions of the road to restore connectivity and pull-back and replant fill materials in other portions. This reach provides a high proportion of the basin-wide spawning habitat for all three species, accounting for roughly 30 percent of steelhead spawning habitat, 51 percent for fall Chinook and 38 percent for coho. Riparian and floodplain conditions have been degraded by road fill encroaching on the channel. This phase of the project will treat 2.1 miles of streambank and restore floodplain access along .94 mile of road. The land trust will contribute \$96,550 from two grants.

Restoring Lower White Creek Habitat Yakama Nation

\$329,400

The Yakama Nation will use this grant to restore White Creek habitat. Work will include placing large woody debris in the channel to improve its complexity and increase the number of pools, where salmon rest and eat. White Creek is a tributary of the Klickitat



River and is an important spawning and rearing area and home to steelhead, which are threatened with extinction. In recent years, the White Creek watershed has accounted for up to 40 percent of the observed steelhead spawning in the entire Klickitat subbasin. Work will be done between river mile 3 and 6 and will involve treatment at 18 locations. The Yakama Nation will contribute \$143,000 from a federal grant and donated materials. (05-1622R-FY06)

Restoring Tepee Creek Habitat Yakama Nation

\$243,045

Tepee Creek, a tributary to White Creek in the Klickitat River subbasin, provides important spawning and rearing habitat for middle Columbia River steelhead, which are threatened with extinction. Tepee Creek has accounted for up to 21 percent of the observed spawning in the Klickitat subbasin in recent years. Extensive reaches of Tepee Creek are incised and now become dry in late summer in many places. This grant will help the Tribe restore floodplain connectivity by raising or filling the channel to historic levels for a 1,700-foot reach near river mile 7.3 of Tepee Creek. This will allow the stream to flood more often and potentially help restore stream flow. The Yakama Nation will contribute \$43,000 from a federal grant and donated materials. (05-1607R-FY06)

Restoring Klickitat River Habitat Mid-Columbia Regional Fisheries Enhancement Group

\$296,002

The Mid-Columbia Regional Fisheries Enhancement Group will use this grant to restore habitat for steelhead, which are threatened with extinction, and spring Chinook in the lower Klickitat River. Work will be done from the mouth of the Klickitat River to the Little Klickitat reach (river miles 12.1 to 13.6). Work includes placing six areas of large woody debris in the river to enhance channel complexity and help maintain a side-channel, replanting 2.2 acres of floodplain along 1,625 feet of bank and planting an additional 2.8 acres of upland with ponderosa pine. The plantings will increase bank stability and shade the river, keeping it cool for salmon. The fisheries group will contribute \$52,300 from state and local grants, donated materials and volunteer labor. (05-1626R-FY06)

Lower Columbia Fish Recovery Board

\$1,346,897

Protecting Willow Grove Columbia Land Trust

\$56,125

The Columbia Land Trust will use this grant to permanently protect 380 acres of intertidal wetland and off-channel habitat within a reach of the Columbia River that has lost a majority of its floodplain to development. The Willow Grove property provides a diverse and extensive network of distributary channels critically important to rearing and migrating salmon. The site is connected to the Columbia River through Coal Slough, and is immediately adjacent to Coal Creek, which is home to fall Chinook salmon. The



intertidal wetland habitat is largely intact; however, future restoration work will restore native wetland communities, control invasive plants and enhance the hydrologic connection of the site to the mainstem river. The landowner, the Port of Longview, will seek to achieve an economic gain from the property if a land preservation agreement cannot be accomplished. The land is immediately downstream of the Longview industrial area, and generally is surrounded by expanding development. The land trust will contribute \$324,500 in donated land and two grants. (05-1504A-FY06)

Assessing Regional Fish Barriers Lower Columbia Fish Recovery Board

\$250,000

The Lower Columbia Fish Recovery Board will use this grant to develop a regional list of barriers to fish migration. Work will include compiling data from other entities and developing a regional, prioritized list of fish passage barriers both in electronic formats and maps. The regional list will be used to design projects to remove five of the highest priority barriers. The recovery board will contribute \$50,200 from a state grant, donated equipment and materials, and volunteer labor. (05-1557N-FY06)

Assessing the Historic Skamokawa Creek Channel Cowlitz-Wahkiakum Conservation District

\$31,000

To protect the town of Skamokawa from flooding in the 1940s, a new channel and dikes were built, abandoning the lower 2 miles of the middle valley Skamokawa Creek. The historic channel's watershed was reduced to 250 acres. A tidegate was installed at the outlet and an 18-inch pipe with a gate valve was installed at the upstream end. This meandering reach of the middle valley Skamokawa would have provided migration and rearing habitat to coho, chum and fall Chinook salmon and steelhead. During the past 60 years, water quality has declined and the tidegate and available hydrology are not sufficient to maintain water quality. The upper half of the channel is beginning to fill in. During the summer, stream temperatures increase, and dissolved oxygen is depleted. The Cowlitz-Wahkiakum Conservation District will use this grant to assess the water quality and level in the Skamokawa Creek channel in preparation for restoration work that includes removal of the tidegate. The conservation district will contribute \$5,480 in donated equipment, volunteer labor and a state grant. (05-1541N-FY06)

Restoring a Coweeman Tributary Cowlitz-Wahkiakum Conservation District

\$50,000

The conservation district will use this grant to restore the lower 2,000 feet of an unnamed tributary entering the Coweeman River at river mile 13.3. Work will include replacing a fish passage barrier, opening up 2.5 miles of habitat; placing large woody debris in the river to create pools where fish can rest, feed and hide from predators; planting 2.25 acres of riparian area; and installing livestock fencing. This project will benefit Chinook, coho and chum salmon, steelhead and coastal cutthroat. The conservation district will contribute \$10,500 in donated cash, equipment and materials, volunteer labor and a state grant. (05-1547R-FY06)



Assessing Projects for the Lower Cowlitz River Basin Lower Columbia Fish Recovery Board

\$168,300

The Lower Columbia Fish Recovery Board will use this grant to evaluate potential restoration projects for the lower Cowlitz River basin, focusing on reconnecting off-channel rearing habitats, placing rock and wood structures in streams to create habitat, constructing groundwater-fed spawning and rearing habitats and restoring riparian and floodplain habitats. A ranked list of projects will be produced as well as preliminary designs and budgets for the highest priority projects. The recovery board will contribute \$29,500 in donated cash and equipment and volunteer labor. (05-1599N-FY06)

Studying Cispus River, Columbia Springs Lower Columbia River Fisheries Enhancement Group

\$76,000

The Lower Columbia River Fisheries Enhancement Group will use this grant to study Yellow Jacket Creek, near the confluence with the Cispus River and Columbia Springs in order to design two off-channel spawning and rearing habitat restoration projects. Project partners for the Yellow Jacket Creek and Cispus River assessment include the U.S. Forest Service and North Gifford Pinchot Resource Advisory Committee. Partners at Columbia Springs include Columbia Springs Environmental Education Center, Evergreen School District, Clark Public Utilities, Washington Department of Fish and Wildlife and a landowner. The fisheries group will contribute \$26,000 in funding and a federal grant. (05-1613N-FY06)

Studying the Influence of Carcass Analogs Lower Columbia Fish Recovery Board

\$128,039

The Lower Columbia Fish Recovery Board will use this grant to place carcass analogs, which are pasteurized, nutrient-rich briquettes that supply key nutrients for salmon production in the Wind River watershed. United States Geologic Survey staff will monitor the biological responses of algae, aquatic insects, fish and water chemistry over the growing season and compare the responses to those from nearby streams that receive no nutrient enhancement. The recovery board will contribute \$22,600 in donated equipment and volunteer labor. (05-1616N-FY06)

Restoring Coweeman River Channels Cowlitz-Wahkiakum Conservation District

\$81,000

The conservation district will use this grant to improve channel stability and habitat diversity of the Coweeman River. Work will include establishing 5.5 acres of forest on 800 feet of streambank and adding rocks and large woody debris, such as tree root wads, to shape the river bank and allow the plants to establish. This project will benefit Chinook, coho and chum salmon, steelhead and coastal cutthroat. The project site is upstream of a pinch point that forms a mid channel bar with several side channel areas. The Coweeman River has eroded the narrow forested buffer exposing soils, and threatens to abandon the side channel habitat. The conservation district will contribute 18,000 in cash and funding from state and federal grants. (05-1549R-FY06)



Restoring Lockwood Creek Habitat Clark Public Utilities

\$42,000

Clark Public Utilities will use this grant to restore 2,000 lineal feet of degraded floodplain habitat along Lockwood Creek at the confluence with the east fork of the Lewis River. Lockwood Creek is home to cutthroat, steelhead and chum, Chinook and coho salmon. This grant will continue a \$250,000 Centennial Clean Water grant and combined, the two will restore 26 acres of riparian habitat, place large woody debris in the creek for salmon habitat, construct an off-channel rearing pond and re-connect the creek to its floodplain and wetlands by removing a 2,500-foot-long dike. Clark Public Utilities is partnering with the Monahan family and the Lower Columbia Regional Fisheries Enhancement Group. Clark Public Utilities will contribute \$8,000 in donated materials. (05-1590R-FY06)

Restoring Cedar Creek Fish First

\$94,970

Fish First will use this grant to restore the structure and complexity of 1,400 feet of stream channel. Past activities, such as dams, logging and grazing, have caused Cedar Creek to become one long, shallow, unstable run with no riffles, pools or protective cover for salmon (coho, Chinook and steelhead) that once made extensive use of the creek. This is one of the few tributaries below the power dams that cut off fish migration on the north fork of the Lewis River. Work will include adding root wads and gravel holding cross-vanes to return pools and riffles to the creek and allow eroded banks to re-vegetate. Crews also will plant trees and shrubs to provide shade and cover, and re-activate a small side-channel to furnish rearing and flood protection to young salmon. This restoration should produce new, high quality spawning areas and resting pools, cover and protection for fish, rearing habitat and cooler water temperatures in the summer. Fish First will contribute \$16,760 in donations.

Decommissioning a Road Near Muddy River Lower Columbia River Fisheries Enhancement Group

\$61,000

The Lower Columbia River Fisheries Enhancement Group will use this grant to decommission 1.8 miles of road, including one failed culvert, two fish passage barriers on tributaries to the Muddy River and 14 other culverts at risk for failure. A total of 18 culverts will be removed or replaced. One-half mile of habitat exists above the two fish passage barriers on the Muddy River. The improvements will help Chinook and coho salmon and steelhead, all of which are threatened with extinction. The fisheries group is partnering with the U.S. Forest Service and will contribute \$83,000 in donations, local and private grants and cash. (05-1595R-FY06)

Assessing Projects for Woodard Creek Lower Columbia Fish Recovery Board

\$55,000

The Lower Columbia Fish Recovery Board will use this grant to evaluate potential restoration projects for Woodard Creek, focusing on reconnecting off-channel rearing habitats, placing rock and wood structures in streams to create habitat, constructing groundwater-fed spawning and rearing habitats and restoring riparian and floodplain



habitats. A ranked list of projects will be produced as well as preliminary designs and budgets for the highest priority projects. The recovery board will contribute \$28,000 in funding and labor. (05-1597N-FY06)

Restoring Woods Creek Fish Passage Lewis County Conservation District

\$120,000

The Lewis County Conservation District will use this grant to replace an impassable culvert on Woods Creek, opening up 5.9 miles of habitat for Chinook and coho salmon, cutthroat and steelhead. Woods Creek provides abundant, quality habitat and important spawning and rearing areas for salmon unique to the upper Cowlitz River. Work will include installing flood relief culverts on the floodplain to reduce the risk of road failure and to help maintain vehicle access. The conservation district will contribute \$153,000.

Developing the Zerr Chum Channel Grays River Habitat Enhancement District

\$80,724

The Grays River Habitat Enhancement District will use this grant to excavate a drainage ditch and create a side channel off the Grays River for fish habitat. The channel will range from 15 to 20 feet in width, run about 2 feet deep and have at least 3-foot flats on each side. Side channel habitat of this type is not available in the lower 13 miles of Grays River. The district will contribute \$17,500 in donated materials, and property interest and volunteer labor. (05-1567R-FY06)

Upgrading Nikka Creek Tidegate Grays River Habitat Enhancement District

\$52,739

The Grays River Habitat Enhancement District will use this grant to replace the existing 30-inch tidegate with a 60-inch fish access gate. The gate also will be lowered to ensure year-round connectivity to the river. The district will contribute \$9,310 in volunteer labor. (05-1568R-FY06)

Mason Conservation District

\$719,310

Removing the Frye Cove Bulkhead South Puget Sound Salmon Enhancement Group

\$95,000

The South Puget Sound Salmon Enhancement Group will use this grant to remove a bulkhead in Eld Inlet directly across from Frye Cove County Park. The bulkhead is 6 feet tall, 110 feet long and encroaches on the beach by 35 feet. The bulkhead limits potential beach spawning habitat for fish that salmon eat. Work will include removing the bulkhead and fill material behind it, restoring the beach and adding rocks and large woody debris to increase the beach diversity and protect the bluff from erosion. The salmon group will contribute \$16,500 from a state grant. (05-1399R-FY06)



Restoring Skookum Inlet Estuary South Puget Sound Salmon Enhancement Group

\$104.500

The South Puget Sound Salmon Enhancement Group will use this grant to improve habitat along Skookum Inlet by removing several tons of concrete beach armoring, pilings and an old bridge and replanting a salt marsh and estuary. An old stream crossing will be replaced with a 30-foot timber bridge to allow for better fish passage, stream continuity and tidal inundation. Large woody debris will be placed in the freshwater stream to create habitat and plants will be added to a 2-acre wetland and salt marsh. This is an important project because of its proximity to Skookum Creek. Many salmon species rely on this area to transition to saltwater. Typically forage fish, coastal cutthroat and coho and Chinook salmon use these areas as refuge. The salmon group will contribute \$19,300 from a state grant and donated materials. (05-1397R-FY06)

Creating Salmon Habitat in Skookum Creek Squaxin Island Tribe

\$94,810

The Squaxin Island Tribe will use this grant to place large woody debris in Skookum Creek (between river mile 1 and 2) to create salmon habitat. Declines in habitat quantity and quality along with poor ocean returns threaten the continued survival of naturally reproducing chum and coho in Skookum Creek. The large woody debris will create pools and riffles as well as cover, so salmon can rest, eat and hide from predators. The Tribe will contribute \$20,000. (05-1442R-FY06)

Replacing the Jarrell Cove Culvert South Puget Sound Salmon Enhancement Group

\$410.000

The South Puget Sound Salmon Enhancement Group will use this grant to replace an undersized and plugged 3-foot culvert at Jarrell Cove on Harstine Island. This project is in the tidal estuary of Pickering Passage. Once cleared, the culvert will provide passage for Chum, coho and coastal cutthroat to the 1 mile of habitat upstream from the culvert. The culvert does not allow for natural stream function or tidal exchange and is a significant barrier for salmon. The new culvert will be 16 feet round and about 115 feet long. The salmon group will contribute \$75,000 from donations and volunteer labor. (05-1424R-FY06)

Replacing the Wival Road Culvert Mason County

\$15,000

Mason County will use this grant to replace a culvert on an intermittent, unnamed tributary to Gosnell Creek, 5 miles southwest of Shelton. The culvert is 3 feet by 5 feet with an outfall drop of about 1 foot. The County will install an 11-foot-wide culvert and fill a downstream plunge pool, opening 2,000 feet of high quality spawning and rearing habitat for coho and chum salmon and coastal cutthroat. The County will contribute \$65,000 in equipment, labor and a federal grant. (05-1625R-FY06)



Nisqually River Salmon Recovery \$1,667,783

Protecting the Manke Shoreline for Salmon Nisqually River Land Trust

\$276,318

The Nisqually River Land Trust will use this grant to acquire about 70 acres along the Nisqually River between the Mashel River mouth and Ohop Creek. This land is the last substantial, privately owned shoreline in this reach of the Nisqually River, and completing this purchase will mean that the entire reach is protected. The acquisition includes shoreline and upland to the top of the bluff. This property is adjacent to the already protected Nisqually-Mashel State Park and across the river from the shoreline owned by Tacoma Power. Salmon, in particular Chinook and steelhead, use this area for spawning and rearing. Permanent protection will ensure that these salmon uses will not be eroded by housing development. The land trust will contribute \$48,762 in cash and donations. (05-1526A-FY06)

Protecting the Nisqually River Shoreline Nisqually River Land Trust

\$284,975

The Nisqually River Land Trust will use this grant to acquire about 20 acres along the Nisqually River in Thurston County and downstream of Powell Creek. Much of the upland portion of the property is heavily forested, and will be managed for timber harvest. The river is used for spawning and rearing by several species, including Chinook salmon and steelhead. This acquisition would make a substantial addition to the block of protected habitat along the Nisqually River. The land trust will contribute \$50,290 in donations and cash. (05-1528A-FY06)

Restoring Lower Ohop Creek South Puget Sound Salmon Enhancement Group

\$1,106,490

Ohop Creek is a Nisqually River tributary near Eatonville. It supports stocks of fall Chinook, coho and pink salmon, steelhead and trout. Work will include raising 4.4 miles of severely channelized creek to its original floodplain and recreating a 5.3-mile long stream with its original meander pattern and connection to the adjacent floodplain and wetlands. The salmon group also will create off-channel habitat and plant the creek banks with native plants. The salmon group will contribute \$195,264 in donated labor and a local grant. (05-1503R-FY06)

North Olympic Peninsula

\$935,264

Decommissioning Deep Creek Logging Roads North Olympic Salmon Coalition

\$260,000

The North Olympic Salmon Coalition and the U.S. Forest Service will use this grant to decommission 11 miles of logging roads associated with Forest Service Road 3040. Work will include removing all culverts and fills, pulling back unstable road fill areas,



improving drainage and controlling erosion of the disturbed areas to re-establish the plants. These roads traverse three watersheds: Deep Creek, East Twin River and West Twin River. Landslides and flooding associated with the roads have affected water quality and altered fish habitat. Coho and chum salmon, steelhead, cutthroat and Pacific lamprey are present in Deep Creek, East Twin River and West Twin River. The salmon coalition will contribute \$260,000 (05-1485R-FY06)

Helping to Create Salmon Habitat Lower Elwha Klallam Tribe

\$292,000

The Lower Elwha Klallam Tribe will use this grant to place large woody debris, which helps create salmon habitat, in Deep Creek and East Twin River. Work will focus on the west and east forks of Deep Creek, upper Deep Creek and East Twin River. The streams are home to coho salmon, steelhead and cutthroat. This project will continue restoration efforts in the two areas, which have included placing large woody debris in the creek, developing off channel habitat, planting and decommissioning roads. The Tribe will contribute \$65,000 in donated equipment and materials, volunteer labor and a federal grant. (05-1484R-FY06)

Restoring Hoko River Salmon Habitat

\$383,264

Washington Department of Natural Resources, Olympic Region

The Department of Natural Resources will use this grant to restore a unique and historically complex floodplain section of the Hoko River at its confluence with two major tributaries (Ellis Creek and Creek 191). The project will improve habitat complexity, floodplain connectivity, side channel availability, tributary access and riparian function. Work will include removing two log bridges and their fill, which are constricting the channels, reloading 1 mile of channel with up to 400 pieces of large woody debris and replanting 1 mile of stream bank to enhance salmon habitat. The restoration will benefit Chinook and coho salmon, steelhead and cutthroat. The department is partnering with the Makah and Lower Elwha Klallam tribes. The department will contribute \$71,470 in equipment, labor and materials. (05-1489R-FY06)

Okanogan County & Colville Confederated Tribes

\$531,272

Replacing a Diversion Structure in the Twisp River Methow Valley Irrigation District

\$80,000

The Methow Valley Irrigation District will use this grant to replace its diversion structure on the Twisp River at river mile 3.2. The structure is a push-up dam that must be constructed annually with heavy equipment in the river. This structure can prevent fish from migrating during low flows. Work will include replacing the structure with a rock-based weir to provide improved fish passage, create pool and drop habitat that is lacking in this river reach and eliminate the need for annual use of equipment in the



river. The Twisp River provides important spawning habitat for bull trout, Upper Columbia summer steelhead and Upper Columbia spring Chinook salmon. The district will contribute \$156,000 in federal and local grants (05-1632R-FY06)

Replacing a Diversion Dam in the Methow River Methow Valley Irrigation District

\$300,000

The Methow Valley Irrigation District will use this grant to replace a diversion dam on the Methow River at river mile 45. The river is bypassing the dam as it migrates to the west in a side channel. Crews must block the side channel every year using heavy equipment to maintain flow into a canal. As a result, 1/2 mile of side channel habitat is dry much of the year. The district will remove the present dam and rebuild it upstream from the side channel. The new structure will incorporate fish passage, eliminate the need to use heavy equipment in the river and allow natural re-watering of the side channel. The Methow River is a historic and currently important upper Columbia spring Chinook salmon and upper Columbia steelhead spawning stream. The district will contribute \$550,000 in federal and local grants, donated equipment and volunteer labor.

Protecting the Twisp River Methow Salmon Recovery Foundation

\$151,272

The Methow Salmon Recovery Foundation will use this grant to acquire 10.36 acres along the Twisp River. The acquisition will complete the purchase and protection of 24.24 acres of contiguous riverfront, side channel and riparian habitat. The area provides spawning, rearing and over-wintering habitat for endangered spring Chinook salmon and summer steelhead. This land is at risk of development and is critical to continued high quality habitat function in this reach. Once acquired, the foundation will begin restoration projects, including reconnection of side channel habitat, floodplain storage, interpretive education, public access, trails and an educational facility. Community support comes from the Town of Twisp, Washington Department of Fish and Wildlife, Methow Conservancy, Colville Confederated Tribes, Yakama Nation and the current property owners. The foundation will contribute \$49,563 from a local grant and donated labor. (05-1469A-FY06)

Pacific County

\$650,600

Restoring Forks Creek Pacific Conservation District

\$35.100

The Pacific Conservation District will use this grant to place large woody debris in Forks Creek, redirecting the creek to its historic channel. The river has eroded its banks. Work will include stabilizing .1 mile of the 15-foot-high stream bank. There is a 6- to 8-foot-high bar that has formed were the historic channel existed. The bar will be lowered. The project is upstream from the Forks Creek Hatchery. Erosion from the site consistently clogs the hatchery intake. The conservation district will contribute \$6,200 in cash, donated materials and volunteer labor. (05-1563R-FY06)



Creating Habitat in the Naselle River Pacific Conservation District

\$169,400

The Pacific Conservation District will use this grant to place large woody debris in the Naselle River. The river has eroded its banks and placement of debris will slow down winter flows allowing spawning gravel to settle out. Work will include stabilizing .2 mile of stream bank. After construction, the conservation district will plant native vegetation in the area. The district will contribute \$29,845 in donated labor. (05-1561R-FY06)

Creating Salmon Habitat on the Naselle River Pacific Conservation District

\$190,000

The Pacific Conservation District will use this grant to place large woody debris in the south fork of the Naselle River. The debris will provide places for young salmon to hide and slow down the river so that spawning gravel will fall out. Work will include stabilizing .1 mile of stream bank by planting trees and shrubs and removing Japanese Knotweed. The district will contribute \$33,530 in donated equipment and labor.

Assessing Projects in the Willapa Watershed Pacific Conservation District

\$101,500

The Pacific Conservation District will use this grant to identify restoration and acquisition projects within the Willapa River watershed and prioritize them. The conservation district will contribute \$22,324 in donated equipment and volunteer labor. (05-1538N-FY06)

Replacing the North River Culvert Pacific Conservation District

\$154,600

The Pacific Conservation District will use this grant to replace a culvert on an unnamed tributary to the North River at milepost 8.3. The culvert is at the mouth of the creek. It's 3 feet in diameter, 80 feet long, with a 7-foot outfall drop to the river, making it completely impassable to all fish. The stream could support coho salmon and cutthroat. Work will include replacing the culvert with one that is 96 feet long and 15 feet wide; adding large woody debris, rock weirs and gravel to improve fish habitat; and replanting the area. The conservation district will contribute \$100,000. (05-1583R-FY06)

Pend Oreille Conservation District

\$774,603

Assessing Restoration Actions Needed in Granite Creek Kalispel Tribe

\$149,342

The Kalispel Tribe will use this grant to complete a watershed assessment and restoration strategy for Granite Creek. Bull trout populations are depressed in this system because of past land uses. This assessment will identify and prioritize factors that are limiting the growth of the population and recovery actions needed to reverse the trend. Work will include organizing data, identifying data gaps, collecting data, analyzing limiting factors, writing a strategy and developing conceptual designs for the



top ten recovery actions. The Tribe will contribute \$60,377 in federal and local grants, equipment, labor and donated equipment. (05-1443N-FY06)

Removing Cedar Creek Culverts Pend Oreille Conservation District

\$76,797

The Pend Oreille Conservation District will use this grant to remove two culverts and a ford, which are partially blocking fish passage on Cedar Creek. The project will open about 3.75 miles of habitat for bull trout and westslope cutthroat. Cedar Creek is a tributary to the Pend Oreille River. Historically, bull trout from the Pend Oreille River and Lake Pend Oreille spawned and reared in tributaries such as Cedar Creek. In 2005, the Cedar Creek Dam, which blocked fish passage to this part of Cedar Creek, was removed. With the dam gone, it is now important to remove these remaining barriers to allow unimpeded access to the entire Cedar Creek watershed upstream of the former dam. The conservation district will contribute \$13,553 from a federal grant, donations and volunteer labor. (05-1448R-FY06)

Opening Indian Creek Kalispel Tribe

\$59,715

The Kalispel Tribe will use this grant to remove the last barriers to fish passage on Indian Creek. Fish habitat in the project area is blocked by an impassable culvert and damaged by grazing horses. Upstream from the culvert, splash boards have been placed to create a small pond and silt has filled the channel for about 200 feet. Horses have trampled the creek banks and are preventing native plants from growing. To address these impacts, the Kalispel Tribe will replace the undersized culvert with a small bridge, dredge the upstream channel, stabilize the silt deposits by seeding, install a fence to promote natural bank stabilization and establishment of plants and construct a crossing for livestock. Culverts at two other sites downstream of the project are being replaced to allow fish passage and a third culvert upstream from the project was removed. This project will restore connectivity throughout Indian Creek. The Tribe will contribute \$11,308 in equipment, labor, donated materials and a state grant.

Opening Tacoma Creek for Trout Kalispel Tribe

\$343,102

The Kalispel Tribe will use this grant to replace an impassable culvert in Tacoma Creek, opening 14 miles of spawning and rearing habitat for bull trout, westslope cutthroat and other native fish. Tacoma Creek is a tributary to the Pend Oreille River. Historically, bull trout from Lake Pend Oreille migrated down the Pend Oreille River and spawned and reared in tributaries such as Tacoma Creek. Except for falls 14 miles upstream, there were no barriers to bull trout migration until road construction. Restoration of fish passage at this location is a high priority and will improve recovery of bull trout in the Pend Oreille area. The Tribe will contribute \$60,548 in volunteer labor. (05-1445R-FY06)



Replacing a Culvert on the South Fork of Tacoma Creek Kalispel Tribe

\$145,647

The Kalispel Tribe will use this grant to replace a culvert on a Forest Service road on the north fork of the south fork of Tacoma Creek, opening 3 miles of spawning and rearing habitat for bull trout, westslope cutthroat and other native fish. The north fork is a tributary to Tacoma Creek, which is a tributary to the Pend Oreille River. Historically, bull trout from Lake Pend Oreille migrated down the Pend Oreille River and spawned and reared in tributaries to the Pend Oreille River such as Tacoma Creek. The Tribe will contribute \$25,703 in volunteer labor. (05-1446R-FY06)

Pierce County

\$1,484,764

Protecting and Restoring Bee Spit Honey Pierce County Conservation District

\$552,228

South Prairie Creek, the primary tributary to the Carbon River, is the most important salmon spawning area in the Puyallup watershed, producing nearly half of all the wild steelhead in the Puyallup River system, the only significant run of pink salmon and important returns of Chinook, coho and chum salmon and coastal cutthroat. The high quality habitat along the stream is threatened with development. The conservation district will use this grant to acquire and restore 20 acres of good quality riparian habitat. The property is for sale as three home sites, one of which is already developed. Many organizations and individuals have joined in the district's efforts along South Prairie Creek. The project will include an active public involvement component in the riparian restoration phase. The conservation district will contribute \$97,452. (05-1480C-FY06)

Protecting Soler Farms Pierce County Conservation District

\$397,536

The Pierce County Conservation District will use this grant to acquire and restore 26 acres of agricultural land and return it to good quality riparian habitat, building upon previous acquisitions to provide protection to South Prairie Creek salmon. South Prairie Creek, the primary tributary to the Carbon River, is the most important salmon spawning area in the Puyallup watershed, producing nearly half of all the wild steelhead in the Puyallup River system, the only significant run of pink salmon and important returns of Chinook, coho and chum salmon and coastal cutthroat. The property is zoned for agricultural use, and is maintained as pastureland. Many organizations and individuals have joined in the district's efforts along South Prairie Creek. The project includes active public involvement in the riparian restoration phase. The conservation district will contribute \$70,154. (05-1483C-FY06)

Relocating Lower Boise Creek King County Department of Natural Resources and Parks

\$535,000

The King County Department of Natural Resources and Parks will use this grant to relocate the lowest 500 feet of Boise Creek into a newly constructed channel thereby



restoring channel, floodplain and riparian conditions at the mouth of Boise Creek, a tributary to the White River. Boise Creek was placed into its present-day alignment during the construction of a road and railroad. The road and railroad have been removed, and the property is now in public ownership. The project will relocate the lowest 500 feet of channel into a newly constructed channel about 1,200 feet in length. The new channel will meander with no levees or revetments, and it will restore the historic channel gradient and habitat. The berms confining Boise Creek will be removed to restore a floodplain connection with the White River. Boise Creek is one of the most productive tributary salmon streams in the White River basin for Chinook and coho salmon and steelhead. The County will contribute \$95,000. (05-1466R-FY06)

Quinault Nation

\$758,260

Decommissioning Sams River Road Quinault Nation

\$177,300

The Quinault Nation will use this grant to decommission 2.3 miles of the Sams River Road, completing decommissioning of roads in areas with a high potential for sliding into Sams River, harming salmon and salmon habitat. About 12 miles of road above this segment have been decommissioned. This segment has a history of road failure. The Tribe will remove unstable material and all culverts and stream-crossing fills, including two especially large fills and culverts. Additionally, the Tribe will build water bars and cross ditches and plant native plants at stream crossings to reduce erosion. Sams River is the third largest tributary in the Queets River basin. It is home to fall Chinook and coho salmon, steelhead, resident and coastal cutthroat. Bull trout, which are threatened with extinction, also use this habitat. The Tribe will contribute \$32,000 in labor. (05-1619R-FY06)

Inventorying Culverts on Quinault Nation Land Quinault Nation

\$306,300

The Quinault Nation, as steward of the 208,000-acre Quinault reservation, has undertaken a comprehensive fish barrier inventory to assist in its long-term habitat management goals. With about half of this inventory completed, the Tribe has logged about 1,200 culverts and bridges. About 10 percent were considered barriers to fish migration or had failed enough to damage habitat. The Tribe will use this grant to finish the inventory, which gives tribal habitat managers tools to identify and prioritize the most beneficial restoration projects. The Tribe will contribute \$55,020 in donated equipment and volunteer labor. (05-1621N-FY06)

Assessing Nutrient Status Quinault Nation

\$190,880

The Quinault Fisheries Department will use this grant to assess the nutrient status of streams, side channels and terrace channels in the Queets, Clearwater and Quinault



watersheds and to identify candidate sites for nutrient enrichment. The Quinault Fisheries Department will use the results of the assessment to implement a nutrient enrichment program where hatchery salmon carcasses are placed in rivers to increase the growth and survival of young salmon. Carcasses provide critical nutrients that support the food web for young salmon. The Tribe will contribute \$34,485 donated materials and volunteer labor. (05-1629N-FY06)

Fixing Paradise Pond Pacific Coast Salmon Coalition

\$83,780

The Pacific Coast Salmon Coalition will use this grant to repair Paradise Pond, which provides off-channel habitat for young salmon. Located on a small tributary of the Clearwater River, the pond was created in 1985 by building a cedar plank dam across a spring fed channel. A wooden pool and weir fishway was constructed and connected to the downstream end of the dam. The pond was studied over four years and showed coho salmon survival increased from 16 percent before the pond was built to 58 percent after. After more than 20 years, the dam and fishway are severely degraded and have become a barrier to young fish. The Pacific Coast Salmon Coalition has made temporary fixes but a permanent solution needs to be made. The coalition will use this grant to replace the existing wood dam and fishway with a more durable material. The salmon coalition will contribute \$14,500 in volunteer labor. (05-1630R-FY06)

San Juan County

\$319,875

Assessing and Protecting Kelp Beds Friends of the San Juans

\$149,500

Kelp beds are important migratory, resting and feeding habitat for salmon and salmon prey. Identification and mapping of kelp beds is a high priority in the islands and the Friends of the San Juans will use this grant to complete an assessment of kelp beds in San Juan County. The mapped kelp bed locations will be used by local, state, federal and tribal agencies to protect important shorelines through regulations, land acquisitions and land protection agreements and to promote voluntary protection of kelp habitat through education. The Friends group will contribute \$26,500 in volunteer labor.

Drafting a Salmon Habitat Protection Blueprint Friends of the San Juans

\$54,825

The primary goal of the San Juan County Salmon Habitat Protection Blueprint is to achieve long-term voluntary protection for priority shoreline habitats through land acquisition, land protection agreements, long-term stewardship plans and tax-incentive programs. San Juan County's nearshore habitat provides critical resources for salmon and their prey. Protection of this critical habitat has been identified as the most important salmon recovery strategy for the San Juan archipelago at both the local and regional scale. The Friends of the San Juans will use this grant to identify priority



nearshore sites for protection; survey landowners for willingness to participate; educate landowners about shoreline stewardship techniques; work with people to incorporate shoreline protection strategies into their planning and management plans; develop a ranked list of priority nearshore parcels for acquisition and land protection agreements; visit the highest ranked parcels to determine feasibility of either acquisition or protection agreements; and work with the San Juan County Land Bank, the San Juan Preservation Trust, San Juan County and shoreline landowners to conserve priority properties. The friends group will contribute \$9,675 from a federal grant. (05-1497N-FY06)

Studying How to Fix Thatcher Bay Skagit Fish Enhancement Group

\$115,550

The Skagit Fish Enhancement Group will use this grant to assess, design and obtain permits for a future beach and nearshore restoration project in Thatcher Bay on Blakely Island. A mill, operating on the beach until the 1930s, dumped sawdust waste on the beach and in the nearshore areas. Limited tides within the bay haven't washed the debris away. Historic salmon foraging and rearing habitat has been lost as well as forage fish (a salmon food source) beach spawning habitat where gravel was buried under the waste. In addition, the accumulation of wood waste prevents eelgrass, an important salmon habitat, from growing. The Skagit Fish Enhancement Group will use the grant to assess the restoration potential of the area and design a project complete with a budget and construction permits. Assessment will include a determination of the scope of the impact area, an evaluation of what historically existed and a determination of restoration scenarios. The fish enhancement group will contribute \$21,000 in donated materials and volunteer labor. (05-1518N-FY06)

Skagit Watershed Council

\$1,468,379

Restoring the Wiley Slough Estuary Skagit River System Cooperative

\$1,175,155

The Wiley Slough restoration project is on the south fork of the Skagit River, near Conway. The entire \$2.8 million project involves removing 6,500 feet of dike, six tide gates and one culvert to restore tide and river flooding over 160 acres of former tidelands. The Skagit River System Cooperative will use this grant for construction elements, including levee demolition, grading, excavation and permit application and review. When completed, this project will result in the creation of 4.9 acres of tidal channel area and 7.3 miles of tidal channel. These changes will provide all salmon species, including Chinook, which are threatened with extinction, valuable rearing habitat. The Skagit recovery plan estimates that 2,750 acres of tidal marsh restoration are required for Chinook recovery, the highest priority habitat problem in the watershed. Wiley Slough will account for 5.8 percent of this goal. The cooperative will contribute \$207,380 from a federal grant, donated cash and volunteer labor. (05-1615R-FY06)



Protecting and Restoring Elysian Meadows Skagit Land Trust

\$293,224

In partnership with the landowners and Skagit Fisheries Enhancement Group, the Skagit Land Trust will use this grant to protect habitat on 112 acres along the Skagit River through a perpetual land protection agreement. This project presents a rare opportunity to protect a large area of Skagit River floodplain in a dynamic reach of the river. The approved short-plat for this property allows five new homes, each owning a portion of the floodplain, to be built along the edge of the floodplain. Under this proposal, all but one development right associated with the existing farmhouse will be extinguished. The forested portion of the floodplain and the restored habitat will be permanently protected as a habitat reserve (about 68 acres) and limited agricultural use allowed to continue on less vulnerable portions of the floodplain (about 45 acres). The enhancement group will restore native plants on at least 8 acres of floodplain. The landowners intend to donate \$200,000 of the value of the land protection agreement and participate in the restoration work. (05-1520C-FY06)

Snake River Salmon Recovery Board

\$1,409,472

Replacing Fish Screens at Hofer Dam Walla Walla County Conservation District

\$513,000

Located on the Touchet River, Hofer Dam is a barrier to salmon migrating to spawning and rearing grounds in 196 stream miles above the dam. The irrigation diversion at the dam is an imminent threat to young salmon because of poorly designed and outdated fish screens. Correcting these barriers is critical to recovery of mid-Columbia steelhead, re-establishment of spring Chinook salmon and maintenance of bull trout populations. The Walla Walla County Conservation District will use this grant to improve fish passage at the dam and irrigation diversions with fish screens that meet current standards. The conservation district will contribute \$254,300 from a state grant, volunteer labor and donated materials. (05-1539R-FY06)

Protecting the South Fork of Coppei Creek Inland Empire Action Coalition

\$137,972

The Inland Empire Action Coalition will use this grant to install wide riparian buffers and purchase a land protection agreement for the south fork of Coppei Creek, a prime spawning reach for steelhead, which are threatened with extinction. This reach was identified as a high priority for restoration and protection. The project connects 4 miles of existing restoration and protected land immediately upstream to 10 miles of existing riparian restoration immediately downstream. The coalition will contribute \$24,500 in donated materials and volunteer labor. (05-1565C-FY06)



Consolidating the Touchet River Water Withdrawals Washington Department of Fish & Wildlife

\$450,000

The Department of Fish and Wildlife will consolidate three water diversions at Dayton Intake Dam, install fish screens, build a pool and chute fishway to provide improved passage over the dam and build a pipeline to the legal points of diversion. The consolidation and piping will eliminate two gravel berms that divert irrigation water and are constructed every year during critical spawning and migrating times for both steelhead and bull trout, which are threatened with extinction. The fishway will provide passage for young mid-Columbia basin steelhead, bull trout, mountain whitefish, bridgelip suckers and other fish. The department will contribute \$735,000 in funding, donations and federal and local grants. (05-1495R-FY06)

Installing Fish Screens Asotin County Conservation District

\$40,000

The Asotin County Conservation District will use this grant to help landowners update screens on 15 diversions in streams that are home to steelhead, Chinook salmon and bull trout. Most of the screens are small because few landowners in Asotin County irrigate more than 40 acres. The conservation district will contribute \$8,000 in volunteer labor and donated materials. (05-1544R-FY06)

Removing a Barrier to Fish Passage at Curl Lake Washington Department of Fish & Wildlife

\$78,500

The Washington Department of Fish & Wildlife will use this grant to remove a partial barrier for fish passage on the Tucannon River and place large woody debris in and around the pool below the existing weir. The department will contribute \$29,500 in donated labor and materials and a federal grant. (05-1498R-FY06)

Reducing Sediment in George Creek Asotin County Conservation District

\$190,000

The conservation district will use this grant to continue a program for planting seeds on more than 1,200 acres along George Creek. George Creek runs into Asotin Creek, a 325-square-mile tributary to the Snake River, which is home to bull trout, wild summer steelhead and fall, spring and summer Chinook salmon, all of which are threatened with extinction. Keeping the land continually vegetated is important to stopping soil from washing into the creek and covering spawning beds. The planting program will cover 30 percent of the cost for landowners. The conservation district will contribute \$34,500 in donated equipment and materials. (05-1562R-FY06)

Snohomish County

\$1,229,910

Protecting Smith Island Estuary Snohomish County Public Works

\$415,900

Snohomish County Public Works will use this grant to acquire 155 acres of diked land in the Snohomish estuary in order to restore a tidal marsh. Studies have shown that the



Snohomish estuary has lost about 85 percent of its tidal marsh and at least 50 percent of its production capacity for Chinook since the late 19th century. The loss of the estuary is seen as a critical factor contributing to the decline of Chinook salmon. The 155 acres targeted for acquisition are adjacent to the 269-acre Rhodes property purchased in 2001. Combining this land will increase the total potential restoration area, and will include reconnection of a second large tidal channel with key Chinook salmon habitat for rearing, sheltering and transitioning from freshwater to saltwater. Snohomish County will contribute \$695,000 from a federal grant. (05-1514A-FY06)

Restoring Habitat in the Lower Snohomish River and Estuary Snohomish County Surface Water Management Division

\$153,010

The Snohomish County Surface Water Management Division will use this grant to site, design and install 20 large woody debris structures in the Snohomish River to improve salmon habitat. Work will be done along 4,000 feet of bank in two estuaries, known as Norwegian Bay and Field's Riffle on the lower Snohomish River. In addition, crews will plant 3 acres of forest in the area. The lower Snohomish River and estuaries provide critical habitat for Chinook and other salmon. Young salmon use the marsh and edge habitat for rearing. Loss of the tidal marsh and reduced river complexity from armoring and the removal of large woody debris are estimated to have caused the decline in Chinook salmon populations. The County will contribute \$130,000 from a state grant and donated materials and cash. (05-1511R-FY06)

Restoring the Raging River Preston Reach King County Department of Natural Resources & Parks

\$320,000

In 1964, a levee was built along the Raging River, just downstream of the community of Preston. The levee disconnected the river from seven acres of floodplain and confined it to a narrow, straight path. Construction of the levee has eliminated side channels and reduced places for salmon to spawn, grow and hide from predators. The County will use this grant to remove the levee and restore salmon habitat. The County owns the property surrounded by the levee and has removed all structures. The County also will purchase a portion of the adjoining 10-acre property, allowing natural processes to unfold upon an additional seven acres of floodplain. The County will contribute \$492,115 in funding, conservation futures and federal and local grants. (05-1521C-FY06)

Purchasing Crabbs Bend Cascade Land Conservancy

\$341,000

The Cascade Land Conservancy will use this grant to acquire 75 acres of floodplain property that supports salmon habitat in the confluence of the Skykomish and Snoqualmie rivers, the major tributaries in the Snohomish basin. Acquisition and subsequent restoration will improve habitat quality and quantity in the main stem of the Snohomish River. Funding from another grant is available to restore the floodplain, sediment and riparian processes that are critical to recovery of salmon and will include planting, reconnecting side channel habitat and breaching a dike. The County will contribute \$100,000 from a federal grant. (05-1513A-FY06)



Stillaguamish

\$1,254,132

Providing a Restoration Crew for the Stillaguamish River Stillaguamish Tribe

\$550,384

The Stillaguamish Tribe will use this grant to help pay for a restoration crew to restore the banks of the Stillaguamish River, its tributaries (Squire Creek, Portage Creek and Lower Pilchuck Creek), and Jorgenson Slough and Leque Island. Work will include removing noxious weeds, planting, then monitoring and maintaining the areas to achieve a survival rate of 80 percent at 3 years. All fish will benefit but work will take place at sites where Chinook salmon spawn, migrate and mature. The restoration crew will be composed of inmates with professional supervision. The Tribe will contribute \$839,500 in donated equipment and materials and volunteer labor. (05-1560R-FY06)

Finding Sources of Sediment Deposits Harming Salmon Snohomish County Surface Water Management Division

\$158,348

The Snohomish County Surface Water Management Division will use this grant to find the sources of sediment deposits that are covering spawning nests and suffocating young salmon. The fall Chinook salmon populations are at extremely low numbers and are threatened with extinction. Technical experts believe that young salmon survival is being limited by fine sediment that is covering the spawning nests, suffocating or entombing the young salmon. The County will collect sample sediments in the south fork of the Stillaguamish River and its tributaries, characterize the known and suspected sources of the sediment and develop a ranked list of sources and recommended capital projects. The County will contribute \$27,944 in donations and labor. (05-1564N-FY06)

Reconnecting the North Meander of the Stillaguamish River Snohomish County Surface Water Management Division

\$245,400

The Snohomish County Surface Water Management Division will use this grant to provide 3,100 feet of off-channel rearing habitat for young salmon in the Stillaguamish River. Almost 70 percent of the off-channel rearing habitat in the main stem of the river has been lost due to the construction of levees and revetments, and the removal of gravel and large woody debris. Historically these side channels provided key areas for Chinook and coho salmon to rear. The north meander is a river bend cut off by a channel straightening project on Cook Slough in the 1930s. The upper end was plugged and over time the lower end filled in with sediments, eventually leaving a wetland with no hydraulic connection to the river. The County will use this grant to build a culvert inlet from Cook Slough, excavate an inlet channel to connect to the upper end of the meander, excavate the meander and connect an outlet to the Stillaguamish River. The County also will place large woody debris, such as tree root wads, at the inlet and outlet to create habitat, and reforest the area. The County will contribute \$180,000.



Replacing the Segelsen Road Culvert and Controlling Erosion Snohomish County Conservation District

\$300,000

Partnering with U.S. Forest Service, the Snohomish Conservation District will use this grant to replace drainage culverts, construct ditches and stabilize fill along 12.3 miles of road. The work is expected to improve water quality and reduce the risk of landslides or sediment landing in the north fork of the Stillaguamish River, and directly into Segelsen Creek, Cascade Creek and the south branch of the north fork of the Stillaguamish River. The conservation district will contribute \$56,000 in equipment, donated materials and volunteer labor. (05-1588R-FY06)

Thurston Conservation District

\$598,000

Restoring Fish Passage in Ellis Creek City of Olympia

\$598,000

The City of Olympia will use this grant to replace a culvert at East Bay Drive on Ellis Creek, restoring fish passage to 1/2 mile of intact stream habitat. Ellis Creek supports spawning and rearing for four species of salmon: chum, coho, cutthroat and steelhead. The City will contribute \$500,000. (05-1623R-FY06)

WRIA 1

\$1,254,832

Restoring the South Fork of the Nooksack River Nooksack Tribe

\$510,034

The Nooksack Tribe will use this grant to place logjams in the south fork of the Nooksack River to increase Chinook habitat quality and quantity downstream from the town of Acme. Hot summer temperatures, low habitat diversity (especially deep pools with cover for salmon) and high levels of fine sediment have limited the habitat in the river. The logjams are designed to increase quantity and quality of pools with cover, increase habitat complexity and reduce fine sediment entering the river from the nearby banks. The Tribe will contribute \$200,000 from a federal grant. (05-1569R-FY06)

Restoring Smuggler Slough Estuary Lummi Business Council

\$257,830

The Lummi Business Council will use this grant to purchase 60 acres of wetlands in the Kwina Slough and Smuggler's Slough drainages. The Tribe also will conduct a feasibilty analysis, select a preferred alternative and develop a design to restore fish passage and tidal hydrology to estuary habitat. The Nooksack River estuary is a significant area for the recovery of Chinook salmon, which are threatened with extinction. The Lummi Business Council will contribute \$85,850 from a federal grant. (05-1580P-FY06)



Assessing Lower Canyon Creek for Restoration Projects Whatcom County Public Works

\$80,750

Canyon Creek, a tributary to the north fork of the Nooksack River, provides critical spawning habitat for Chinook salmon, which are threatened with extinction, and bull trout. In 1994, a levee was built to protect homes from flooding. The County will use this grant to evaluate the lower mile of the river to see what restoration projects might be done and select a preferred option. A design will be prepared for the preferred option. The County will contribute \$14,250. (05-1512N-FY06)

Focus on the North Fork: Side Channels Whatcom Land Trust

\$406,218

The Whatcom Land Trust will use this grant to acquire 42.35 acres of river frontage and side channel habitat on the north fork of the Nooksack River -- a 17.35-acre tract with 1,300 feet of river frontage, side channels and small islands, and a 25-acre parcel on Bell Creek and the north fork with 1,800 feet of frontage, forested side channels and islands. The land trust will restore 34 acres of habitat on the two tracts and on a previously acquired 78-acre Maple Creek site. The Lummi Natural Resources will complete a preliminary design of restoration opportunities on the three properties. The restoration project will address channel stability, habitat diversity and reduction of sediment, all factors limiting Chinook salmon populations along this reach of the river by re-establishing streamside forests and possibly placing large woody debris in the river. The land trust will contribute \$70,220 in donated labor and property interest.

Yakima River Basin Salmon Recovery Board

\$1,362,413

Protecting Easton Reach Habitat Yakama Nation

\$528,985

The Yakama Nation will use this grant to acquire the largest, most complex floodplain property in the upper Yakima watershed. The Runacres property is on the upper Yakima River near the town of Easton and consists of 163.57 acres of pristine floodplain habitat. The property contains more than 2 miles of braided stream habitat, multiple spring brooks and two tributary confluences. In addition the property supports high concentrations of Chinook and coho salmon, steelhead and coastal cutthroat, for spawning and rearing. The Runacres property boasts the highest density of spring Chinook spawning nests in the upper Yakima River. The primary threat to the habitat is development as Kittitas County was recently acknowledged as the second fastest growing county in the state and the property is only 70 miles from downtown Seattle. The Yakama Nation will contribute \$306,500 from a federal grant, donated equipment and materials and volunteer labor. (05-1571A-FY06)



Protecting the North Fork of the Teanaway River Kittitas Conservation Trust

\$461,740

The Kittitas Conservation Trust will use this grant to acquire 2 miles (4 miles both sides of the river) of the north fork of the Teanaway River and 100 acres of floodplain habitat between Dickey Creek and Jack Creek. The Teanaway is a naturally flowing mountain stream that supports populations of bull trout, steelhead and Chinook salmon. This project is part of a strategy to place a land protection agreement along the floodplain of the north fork of the Teanaway River, which is a major tributary to the Yakima River. The larger project includes the 5.83-mile reach (11.6 miles both sides of the river) and 354 acres of floodplain, forest and meadow between Lick and Jack creeks. The highly functional floodplain supports a diverse ecosystem and sits within a 45,000-acre block of private forestland. The area is a popular recreation gateway to the Wenatchee National Forest and renowned for its scenic beauty. The conservation trust will contribute \$83,000 in funding and donated labor. (05-1572A-FY06)

Removing Currier Creek Fish Barriers Kittitas Conservation Trust

\$371,688

The Kittitas Conservation Trust will use this grant to remove two fish passage barriers in the Currier/Reecer Creek tributary of the Yakima River, opening 1.7 miles of rearing habitat for steelhead and Chinook and coho salmon. The trust will protect a corridor of 75 feet along both banks with a land protection agreement on 9.7 acres, providing opportunity for floodplain restoration. In addition, the trust will pipe irrigation water to agricultural landowners and construct weirs and bank terracing to enhance floodplain functions. Regulated flows in the Yakima River create rearing conditions that are harmful to young salmon. Opening passage to tributary habitat offers the greatest opportunity for recovering the depleted salmon populations. The trust will contribute \$141,000 in donated property interest, donated cash and a private grant. (05-1573C-FY06)